SECTION 11. LANDSCAPING.*

*Editor's note: Ord. No. O-01-29, adopted July 26, 2001 repealed former section 11, subsections 11.1--11.11, and enacted a new section 11 as set out herein. Former section 11 pertained to similar subject matter and derived from Ord. No. O-99-65, adopted November 15, 1999.

11.1. Purpose. These regulations are intended to:

- A. Require transitional buffer yards when necessary to enhance and preserve the value of buildings, reduce adverse effects of traffic, lighting, noise, dust and odor, and to protect building occupants' privacy by requiring spacing and screening between uses of different types or intensities. Such transitional buffer yards as required herein are intended to be tailored according to the intensity of the use and adjacent uses. The greater the difference in intensities the deeper the transitional buffer yard; the less the difference in intensities the shallower the transitional buffer yard.
- B. Enhance the visual appearance of parking lots by breaking up large expanses of pavement, to create and distribute shade throughout parking lots, and to help define parking areas.
- C. Enhance the visual appearance of nonresidential and applicable residential developments.

(Ord. No. O-01-29, § 3, 7-26-2001)

- **11.2. Requirements for plants used for landscaping.** When plants are used for landscaping under this section, the following requirements shall apply:
 - A. Location and spacing. Plants shall be staggered or clustered as necessary to meet the requirements of this section 11, including screening requirements, and to meet the needs of the particular species of plants for root space, water, light, and circulation.
 - B. Minimum sizes at planting. Plants shall be of the following minimum sizes at the time of planting:

Plant	Height	Caliper (Measured at 6" above the ground)	Canopy Spread
Canopy trees	8 feet	2.5 inches except for: Pecan (Carya illinoensis); Southern Magnolia (Magnolia grandiflora); Water Oak (Quercus nigra); Surmard Oak (Quercus shumardii); Southern Red Oak (Quercus falcate)	3 feet
Understory trees	5 feet	2 inches (May include cumulative calipers for multi-trunk understory trees)	N/A
Shrubs	30 inches	N/A	N/A

C. Height at maturity. As they grow, plants shall have an expected height according to type and species, and at each age, shall be maintained at expected heights. Plants shall be trimmed and maintained at natural shapes. At maturity, the following heights shall apply unless otherwise provided for in this section:

Plant	Height
Canopy trees	In excess of or equal to
	thirty (30) feet
Understory trees	Under thirty (30) feet
Shrubs	Minimum of four (4) feet
	(When used for required screening)

- D. Tree Preservation. Two tree credits for general landscaping requirements may be given for each existing mature canopy and understory tree, when such tree is of a specimen as listed above in subsection 11.2.B. Two tree credits for screening may be given for each existing mature canopy and understory tree, as listed above in subsection 11.2.B., provided such trees are located in the appropriate area where such landscaping is required and provided such trees furnish consistent and adequate screening of the subject property as determined by the City. A mature tree is a tree measuring at least 12 inches in caliper at 5 feet above the ground.
- E. Artificial plants and trees. Artificial plants and trees shall not satisfy the requirements of this section.
- F. The installation of indigenous plants and plants which encourage water conservation is encouraged.
- G. Outdoor pedestrian amenities. The installation of fountains, public spaces, exterior furniture, bicycle racks and other outdoor pedestrian amenities, located within or adjacent to landscaping, which emulate traditional design and complement the principal building or structure, is encouraged.

(Ord. No. O-01-29, § 3, 7-26-2001; Ord. No. O-03-03, § 3, 1-21-2003; Ord. No. 0-06-40, § 4, adopted 8/21/06)

11.3. Requirements for fences, walls and berms used for landscaping.

When fences, walls or berms are used for landscaping, such as for screening under this section, the following requirements shall apply:

A. Fences and walls.

- 1. The posts and grade beams of landscaping fences and walls used for landscaping shall be designed and constructed using materials and methods anticipated to last at least 20 years without major repair.
- 2. Fences and walls made of wood shall have a cap rail along the entire length of the fence, and have a cap rail that is of a style, color and makeup that otherwise blends with or complements the wooden fence or wall.
- 3. All wood fences and walls used to meet landscaping requirements shall have either a grade beam or rot board, as appropriate, along the entire length of the base of the wooden section of the fence. The grade beam or rot board shall be at least four inches high, and may be partly below grade.
- 4. All masonry fencing used to meet landscaping requirements shall be constructed of the primary building material of the principal building, and shall be complementary in design to the principal building.
- 5. Where applicable, all masonry fencing shall comply with the provisions of section 7A.2.E, regulating primary materials and colors for the exteriors of buildings, structures and fences.
- 6. Use of chain link fencing materials shall not satisfy the requirements of this section for fences, walls or screening.

B Berms

- 1. Berms shall be constructed with soft, natural forms, and with smooth transitions, at a slope of no greater than one unit rise to four units run, unless stabilized by an anchored, durable retaining wall.
- 2. Berms shall be planted with trees, shrubs, vines, grasses, or other ground cover. Part of a berm may be devoted to a non-living screen such as a fence or wall.

(Ord. No. O-01-29, § 3, 7-26-2001; Ord. No. O-08-41, 07-21-2008.)

11.4. Transitional buffer yards.

- A. Required. Transitional buffer yards shall be required as set forth herein whenever:
 - 1. A proposed nonresidential use adjoins a residential use in a residential district or adjoins undeveloped property in a residential district;
 - 2. A proposed residential use adjoins a nonresidential use;
 - 3. A proposed nonresidential use adjoins a nonresidential use of a different intensity;
 - 4. A proposed residential use adjoins a residential use of a different density in a residential district; or,
 - 5. A nonresidential use is adjacent to a collector or major thoroughfare as determined under the city's major thoroughfare plan.

B. Exceptions.

- 1. Section 11.4 shall not apply to transitional buffer yards between individual uses within the same integrated business development.
- 2. Section 11.4 shall not apply to public schools.
- 3. In instances where a transitional buffer yard and type A or type B screening are required under section 11.4, and preexisting buffer yard or screening which does not meet the literal buffer yard width or screening specifications required under section 11.4 is in place on the site, the preexisting buffer yards or screens may be accepted, or accepted with modifications, if it is determined by the director of planning to substantially meet the purposes of buffer yards and screening as set forth in section 11.1 hereof.
- 4. While buffer yards are not required between nonresidential uses of similar intensities, sufficient areas shall be provided between such uses to allow the installation of required landscaping for screening purposes.
- C. Screening. Screening within a transitional buffer yard shall be either type A screening or type B screening as set forth below:
 - 1. Type A screening. Screening composed of one of the following:
 - a. Masonry wall fencing a minimum eight feet in height and one canopy tree per 30 linear feet of buffer yard. Such fencing shall be located along property lines unless physical constraints exist that

- would prohibit such placement as determined by the director of planning.
- b. Opaque or near opaque live vegetative screening year-round from the ground to a height of at least eight feet at installation with intermittent screening providing a minimum of 25 percent screening during the growing season to a height of at least 20 feet at maturity. A wood fence, a minimum of eight (8) feet in height shall also be located along property lines unless physical constraints exist that would prohibit such placement as determined by the director of planning.
- 2. Type B screening. Screening composed of a minimum of two of the following:
 - a. One canopy tree per 30 linear feet of buffer yard.
 - b. One understory tree per 20 linear feet of buffer yard.
 - c. One shrub spaced a minimum of every 30 inches or less on center along the length of the buffer yard, or a combination of berming and shrubs which includes the minimum planting of one shrub per five linear feet of buffer yard.
- D. Standards. Unless already provided, the following minimum standards for transitional buffer yard depths and associated screening shall be required for the applicable adjoining uses:

Minimum Buffer Yard Depth	Required Screening
Twenty (20) feet	Type A screening consisting of masonry fencing. Exceptions: (1) If the uses adjoin along a public or private street or along a utility, pipeline or drainage easement with a minimum depth of forty (40) feet, Type B screening may be installed. (2) When the nonresidential use does not exceed one-story, is residential in architectural character and does not have a driveway on the side adjoining the residential use, wood fencing may be installed in lieu of masonry fencing to satisfy Type A screening wall requirements.
	Buffer Yard Depth

For a nonresidential use	Twenty (20) feet	Type B screening
adjacent to a collector or		
major thoroughfare:		
For a residential use		Type A screening if Depth option (a) is
adjoining a residential use	Ten (10) feet; or	installed; Type B screening if Depth
OR adjoining undeveloped	Depth option (b):	option (b) is installed
property located in a	Twenty (20) feet	
residential district of a		Exception:
different density:		(1) Type B screening with a minimum
		depth of twenty (20) feet shall be
		installed when the adjacent residential
		use in a residential district is separated
		from the proposed residential use by a
		public or private street.

(O-02-54;10/21/02)

- 2. Anytime a nonresidential use of high intensity is adjacent to a nonresidential district or nonresidential use of medium intensity or a nonresidential district or nonresidential use of low intensity, the following standards shall apply:
 - a. Minimum buffer yard depth: Minimum of ten feet, unless adjacent to a major thoroughfare, then the minimum depth shall be 20 feet.
 - b. Required screening: For a buffer yard that is less than 20 feet, Type A screening shall be installed; For a buffer yard of 20 feet or more, Type B screening may be installed.
- 3. Anytime a nonresidential use of medium intensity is adjacent to a nonresidential district or nonresidential use of low intensity, the following standards shall apply:
 - a. Minimum buffer yard depth: Ten feet, unless adjacent to a major thoroughfare, then the minimum depth shall be 20 feet.
 - b. Required screening: Type B screening.
- 4. Anytime a residential use of any density in a residential district is adjacent to an existing residential use of a different density in a residential district, the following standards shall apply:
 - a. Minimum buffer yard depth: Minimum of ten feet, unless adjacent to a major thoroughfare, then the minimum depth shall be 20 feet.
 - b. Required screening: For a buffer yard that is less than 20 feet, Type A screening shall be installed; For a buffer yard 20 feet or more, Type B screening may be installed

- E. Uses and structures permitted within transitional buffer yards.
 - 1. The following uses and structures shall be permitted in transitional buffer yards as set forth below:
 - a. Utility lines. Utility lines, such as a publicly owned or federal, state or locally approved privately owned utility conduit transporting a utility service commodity, including water lines, sewer lines, storm sewer lines, and natural gas lines. Such utility lines shall cross the transitional buffer yard rather than run along its length whenever feasible.
 - b. Drainage conduit. Culverts, ditches and similar conduit type drainage improvements shall be permitted in a transitional buffer yard when necessary for proper drainage. Such drainage improvements shall cross the transitional buffer yard rather than run along its length whenever feasible.
 - c. Pedestrian and bicycle paths. Pedestrian and bicycle paths shall be permitted within transitional buffer yards.
 - d. Signs. Signs shall be permitted within transitional buffer yards provided they are completely screened from view from any point on adjacent residential district properties and provided that such signs otherwise comply with all the other provisions of the zoning ordinance.
 - 2. Transitional buffer yards shall not be used for parking, loading, storage, or any activity that is either part of or accessory to the proposed use.

(Ord. No. O-01-29, § 3, 7-26-2001; Ord. No. O-02-23, § 3, 6-17-2002; Ord. No. O-02-54, § 3, 10-21-2002)

11.5. Off-street parking areas.

- A. Screening from adjacent properties.
 - 1. Off-street parking areas shall be screened from public view by:
 - a. A solid evergreen hedge consisting of a double row of shrubs planted in a triangular pattern and spaced at a minimum of 30 inches or less; or
 - b. A berm, which reaches a minimum of four feet in height including plantings at maturity.

2. Exceptions:

- a. Screening from adjacent properties shall not be required for offstreet parking areas where adequate screening exists within the subject tract.
- b. Off-street parking areas located to the rear of a principal building located within an I, Industrial District, shall be screened from

public rights-of-way only and not from adjacent properties, and may be screened with a masonry wall, a minimum of four feet in height. However, where such areas are required by state or federal regulations to be secured by specified fencing, such fencing shall suffice for required screening. In the event such specified fencing is chain link fencing, the installation of vinyl slats or other opaque material, where possible, shall be incorporated into such fencing.

3. Landscape plan. Screening must be a part of a landscape plan approved by the city.

B. Landscaping.

- 1. The following landscaping requirements shall apply:
 - a. Perimeter. No less than one canopy tree shall be planted along the perimeter of parking areas for each 30 feet of continuous landscaped parking areas perimeter except for that portion of the parking area which abuts buildings or structures located on the same parcel and except for that portion of the side or rear property line that abuts property that already meets the criteria set forth in this subsection.
 - b. Islands and diamonds.
 - Total planting island and diamond area requirements shall be calculated by the following formula: Total number of parking spaces x 20 square feet = total area required.
 - ii. Each planting island shall be landscaped having no less than one canopy tree planted therein with appropriate vegetative ground cover and having no horizontal dimension of less than nine feet.
 - iii. Each planting diamond shall be landscaped having no less than one understory tree planted therein with appropriate vegetative ground cover and having no less than 36 square feet in area. Planting diamonds shall be located within offstreet parking areas, between parking spaces.
 - iv. Planting islands and diamonds shall be evenly distributed throughout the parking area, and no parking space shall be located more than 40 feet from a planting island or a planting diamond.

2. Exceptions:

a. Landscaping shall not be required in off-street parking areas located within an I, Industrial District where such parking is located to the rear of a principal building, not within view of public roadways, and dedicated for business vehicles and/or employee parking.

- 3. For condominium or multifamily developments, the following additional standards shall apply:
 - a. Landscaping in and around parking areas in condominium or multifamily developments shall be located to minimize the expansive appearance of parking lots, provide shaded parking areas, and mitigate any negative acoustic impacts of motor vehicles. A landscaping island, containing a minimum of one (1) canopy tree, is required to be located to separate at least every twelve (12) parking spaces in a row.
 - b. Every carport section in condominium or multifamily developments shall be separated from an adjoining carport section by at least eight foot wide landscaped area, containing a minimum of one (1) canopy tree.
- C. Damage prevention. Parking spaces shall be blocked or curbed to prevent vehicles from damaging planting islands, landscaped yards, fences or screens.

(Ord. No. O-02-38, § 3, 8-19-2002; O-04-56; 12/20/2004)

Editor's note: Ord. No. O-02-38, § 3, adopted August 19, 2002, repealed App. A, § 11.5, in its entirety and enacted new provisions to read as herein set out. Prior to amendment, § 11.5 pertained to similar subject matter and derived from Ord. No. O-01-29,:s; 3, adopted July 26, 2001.

11.6. Interior landscaping.

- A. Required. The requirements of this subsection shall be minimum standards for and be applicable in R-5, R-6, MF-1, MF-2, LC, LC-0, LC-1, LC-2, LC-3, LC-4, BP, I and PD districts, and specific uses as permitted by section 15 hereof.
 - 1. Twenty percent of the entire area of the site not covered by buildings and not a part of the right-of-way or dedicated public streets, or six percent of the gross area of the site, whichever is greater, shall be required as landscaping to meet the requirements of this section. No less than 50 percent of the required area for interior landscaping shall be provided in front of and to the sides of the principal building.
 - 2. Interior landscaping shall be required to be integrated into the overall design of the surface parking area in such a manner that it will assist in defining parking slots, pedestrian paths, driveways, and internal collector lanes, in limiting points of ingress and egress, in providing traffic calming, in separate parking pavement from street alignments, and in providing visual interruption to rows of parking.

- 3. Landscaping shall be required to screen driveways, outside storage areas, shopping cart corrals, trash disposal areas, ground-mounted mechanical equipment, loading docks, and delivery entrances from public view. With the exception of shopping cart corrals, such screening shall, at a minimum, consist of that required to screen parking in section 11.5. Shopping cart corrals shall be screened, at a minimum, with a single row of shrubs on both sides.
- 4. Landscaping shall be required to interrupt front building lines unbroken for a distance in excess of 150 feet.

(Ord. No. O-01-29, § 3, 7-26-2001)

11.7. Monument signs.

Landscaping shall be placed adjacent to each monument sign in an amount equal to or greater than 50 percent of the area of such monument sign. This landscaping shall consist of bushes, shrubs, annual and perennial flowering plants, and appropriate vegetative ground cover or a combination thereof, and shall be in addition to any other landscape requirements set forth in this section 11, and shall be planted and maintained to be lower than the bottom height of the sign.

(Ord. No. O-01-29, § 3, 7-26-2001)

11.8. General requirements.

- A. Irrigation. All landscaped areas shall be irrigated by means of a subsurface irrigation system.
- B. Clear view. All landscaping shall be located so as not to interfere with the act of parking or with parking areas maintenance, and so as not to create a traffic hazard by obscuring driver or pedestrian vision of the intersections of walkways, driveways, collector lanes and streets or any combination thereof.
- C. Maximum time allowed to provide landscaping and screening.
 - 1. Fences or walls used for screening shall be completed prior to final inspection by the building official.
 - 2. All approved vegetative landscaping and screening, including irrigation systems, shall be in place prior to the issuance of an occupancy permit, or if reasonable considerations prohibit the completion of the planting of landscape material a conditional occupancy permit may be issued for such time as is reasonable to complete the landscape planting.

D. Maintenance.

- 1. Responsibility. The owner, tenant or anyone exercising control of the premises, and their agents and employees, shall be responsible for the placement and maintenance of all landscaping required herein, including irrigation systems; and to keep same in a good condition so as to present a healthy, neat and orderly appearance, free from refuse and debris.
- 2. Repair and replacement. All landscaping and screening, including irrigation systems, shall be maintained to continue its effectiveness. If it deteriorates or dies, it shall be repaired or replaced during the next planting season, or within three months.

(Ord. No. O-01-29, § 3, 7-26-2001)

11.9. Conflict with other regulations.

In the event that section 11 or a part thereof conflicts with any other provisions of the zoning ordinance, the more stringent regulations shall apply. (Ord. No. O-01-29, § 3, 7-26-2001)

11.10. Landscape plan.

Prior to the construction, erection, or alteration of a building or structure subject to the requirements of this section, a landscape plan, prepared by a landscape architect or landscape professional, shall be submitted concurrent with and approved as a part of the application for a building permit. These plans shall also be submitted as a part of a planned development site plan in an application for a planned development district. The landscape plan shall contain as a minimum the following information.

- A. A planting plan of landscape plant material identifying location, size and quantity. The landscape plant material shall be identified by its scientific and common names.
- B. Plans with dimensions and elevations, where appropriate, of special structural elements such as fences, walls, planters, fountains, berms, walkways, irrigating systems, and other elements included as special features to the landscape plant material. For the purposes of evaluating the effectiveness of proposed screening, site sections may be required.
- C. Building outlines, parking areas and arrangements, fences, monument signs and other structural features to be constructed on the site.
- D. Plans shall be prepared at engineering scale of one inch to 40 feet or larger scale and on a sheet size of 24 by 36 inches. The plan sheets shall contain a scale, north arrow, name and address of the landscape architect, designer or architect and the

- site owner and/or developer. The plans shall also identify the development and provide a brief description of the property and its location.
- F. To request credit for the preservation of existing mature canopy and understory trees, the applicant shall note such trees on the landscape plan, shall indicate on such plan the steps to be taken to ensure the survival of the trees, and shall request credit for such noted trees. Subject to city approval, credit for existing mature canopy and understory trees may be credited as set forth in subsection 11.2 of this ordinance. Developers are encouraged to preserve existing mature canopy trees whenever possible.
- G. Planting of canopy trees under aerial utility easements and within municipal utility district easements is discouraged.

(Ord. No. O-01-29, § 3, 7-26-2001; Ord. No. 0-06-40 § 5, 8/21/06)

11.11. Changes to the landscape plan.

Prior to the alteration, enlargement or change to an approved landscape plan, an amended plan shall be submitted to and approved by the director of planning. Such amended landscape plan shall be submitted in accordance with the provisions of section 11 and shall meet the requirements of section 11.10 hereof.

(Ord. No. O-01-29, § 3, 7-26-2001)